

REMARKS

Claims 23-31 were pending in the application. Claims 23, 30, and 31 have been amended.

Claim 23 has been amended to specify that the NPB “inhibits angiogenesis of a cell expressing neuropilin-1.” Support for this amendment can be found throughout the specification as originally filed, e.g., at page 8, lines 11-23.

Claims 30 and 31 have been amended to be multiply dependent.

The foregoing claim amendments or cancellations should not be construed as acquiescence to any of the rejections raised by the Examiner, and were made solely to expedite prosecution of the application. No new matter has been added. Applicants reserve the right to pursue the canceled subject matter, or any subject matter to which they are entitled, in this or one or more subsequent patent applications.

Applicants further note that the originally filed claims were restricted between product and process claims and that the withdrawn method claims that depend from or otherwise include all the limitations of any of the product claims which are deemed allowable will also be rejoined in accordance with the provisions of MPEP §821.04. In light of the foregoing claim amendments, Applicants respectfully submit that elected claims are now in condition for allowance and, therefore, requests rejoinder of the withdrawn method claim.

Rejection of claims 23-30 under 35 U.S.C. §112, First Paragraph

Claims 23-30 are rejected for failing to comply with the written description requirement. Specifically, the Examiner has alleged that the specification fails to provide “support for the concept of a genus of NPBs which bind cell surface neuropilin-1 (emphasis in original).”

Applicants respectfully disagree, specifically, Figure 17 describes the epitopes of several NPBs which bind on cell surface NP-1. However, to expedite prosecution, the phrase “cell surface neuropilin” has been deleted from the claims. Therefore, this rejection should be moot.

Rejection of claim 23 under 35 U.S.C. §103(a)

Claim 23 is rejected as being unpatentable over Soker *et al.* in view of Elledge *et al.* According to the Examiner, Soker *et al.* describe an antibody that binds neuropilin but still

allows neuropilin and VEGF165 to bind each other. The Examiner admits that Soker *et al.* do not describe a monoclonal antibody to neuropilin. However, the Examiner relies on Elledge *et al.* for teaching techniques for producing monoclonal antibodies to known proteins.

Applicants respectfully disagree with this rejection. However, to expedite prosecution, claim 23 has been amended to specify that the NPB “inhibits angiogenesis of a cell expressing neuropilin-1.” The cited references fail to teach or suggest antibodies which inhibit angiogenesis, yet do not inhibit the binding of VEGF165 to neuropilin, as presently claimed.

As applied to the presently claimed NPBs, Applicants respectfully note that the antibody of Soker *et al.* (which does not inhibit the binding of VEGF165 to neuropilin) would not necessarily inhibit angiogenesis, as claimed. Indeed, as was known in the art at the time the present application was filed, VEGF/neuropilin-1 signaling is required for vascular development (i.e., angiogenesis), see e.g., Gu *et al.* (2003) *Dev Cell* 5: 45-57 (enclosed as Appendix A) which teaches that “VEGF-Npn-1 signaling in endothelial cells is required for angiogenesis” (see abstract). Accordingly, neuropilin antibodies which do not inhibit binding of VEGF165 to neuropilin (e.g., the antibody described by Soker *et al.*) would not necessarily inhibit angiogenesis, because angiogenesis involves such binding and related signaling.

Accordingly, based on at least the foregoing, the antibody described by Soker *et al.* would not necessarily inhibit angiogenesis, as claimed. Moreover, based on the knowledge in the art at the time of the present application, one of ordinary skill would not have been motivated nor had a reasonable expectation of success in arriving at the claimed NPBs, because the claimed function of not inhibiting VEGF165 binding to neuropilin would have been thought to have likely rendered the NPB incapable of inhibiting angiogenesis. Therefore, claim 23 is patentable over the cited references.

CONCLUSION

Applicants respectfully submit that the application is now in condition for allowance. If a telephone conversation with Applicants' Attorney would expedite the prosecution of the above-identified application, the Examiner is urged to call Applicants' Attorney at (617) 227-7400.

Applicants believe that no fee is due for this Amendment and Response. If another fee is occasioned, the Commissioner is hereby authorized to charge any deficiencies which should have been filed herewith (or with any paper hereafter filed in this application by this firm) to our Deposit Account No. 12-0080, under Order No. MXI-352USRCE.

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Respectfully submitted,

Electronic signature: /Jeanne M. DiGiorgio/
Jeanne M. DiGiorgio
Registration No. 41,710
LAHIVE & COCKFIELD, LLP
One Post Office Square
Boston, Massachusetts 02109-2127
(617) 227-7400
(617) 742-4214 (Fax)
Attorney/Agent For Applicant